UNITED NATIONS DEVELOPMENT PROGRAMME

UNDP

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DP/PROJECTS/2844
(IND/72/047)
28 February 1980

ENGLISH ONLY

APPROVAL OF UNDP ASSISTANCE TO A PROJECT OF THE GOVERNMENT OF INDIA

Advanced Technology in Semi-conductor Devices, CEERI, Pilani
(Supplementary Assistance) (IND/72/047)

Report of the Administrator*

Date of present approval:	June 1979
Starting date of project activities:	November 1975 (Including previous assistance)
Planned completion date:	March 1981
To be executed by:	United Nations Educational, Scientific and Cultural Organization (UNESCO)
Government implementing agency:	Council of Scientific and Industrial Research (CSIR) through the Central Electronics Engineering Research Institute, (CEERI), Pilani
Estimated cost of assistance planned under present approval:	$ 791 700
Source of UNDP financing:	Indicative Planning Figure (IPF)

I. Background

1. The Central Electronics Engineering Research Institute (CEERI) is one of the national laboratories of the Council of Scientific and Industrial Research (CSIR). It has pioneered in India the development of silicon planar technology and television components. CEERI works closely with the electronics industry to ensure that the results of its research and development activities are translated into production. It has for example, a large number of collaborative agreements with industry covering a large variety of electronic products, and has licensed processes it developed to industry for production.

2. At present there are about six manufacturers of transistors and diodes. However, none of them produces integrated circuits, the annual demand for which is estimated to triple during the second half of the 1970's. Advancement and capabilities in this high-priority field are highly dependent on research and development. This will result not only in greater manufacturing economy and efficiency, but in saving foreign reserves through import substitution.

*In accordance with General Assembly resolution 2688 (XXV) and subsequent authorizations of the UNDP Governing Council, reports are issued seriatim on the approval of UNDP assistance of $250,000 or more (including, if any, assistance financed by Government or by third-party cost sharing).

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3. Educational television is considered to be a potentially important educational method, especially in the rural areas of India. The Government is assigning high priority to experimentation in this communications medium. At present educational television studio equipment is imported. In order to help achieve the Government's goals for educational television, it is considered necessary to develop an indigenous capability to produce such equipment in India, and in November 1975 UNDP assistance was approved 1/ to assist CEERI in continuing and intensifying its research and development work. The supplementary assistance is needed to cover cost escalation of equipment.

II. Objectives and activities

4. The supplementary assistance which will extend project operations for twelve months will not affect the project objectives. The objectives remain to: (a) make available to Indian industry the know-how for manufacturing electronic devices such as microwave transistors, integrated circuit modules and microwave diodes, and educational television studio equipment; (b) train Indian nationals in the field of semi-conductor technology; and (c) expand CEERI facilities for research and development of semi-conductor devices and educational television studio systems. The project activities thus far, have progressed towards realizing these objectives.

III. Inputs

5. A major share of the supplementary assistance now approved is for the purpose of meeting cost escalations on the items of equipment already included in the original project document. When the project was conceived, the costs of the equipment were grossly underestimated. The remaining amount is intended to procure equipment recommended by UNESCO consultants, during a Tripartite Review in November 1979, as well as for development of educational television studios which is one of the long-range objectives of the project.

IV. Financial data

6. The expenditure components of the planned assistance are as follows:

	Previously approved	Present approval	Total approved
	$	$	$
Personnel	313 600	2 800	316 400
Training	206 000	5 400	211 400
Equipment	466 700	783 500	1 250 200
Miscellaneous	11 000	-	11 000
Total	997 300	791 700	1 789 000

7. The estimated total value, expressed in US dollars, of inputs provided directly by the Government to the project is $ 843,300 in kind.

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